



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/970,673	10/05/2001	Kenneth John Molee	53394.000525	1835

7590

04/19/2004

Christopher C. Campbell, Esq.  
Hunton & Williams  
1900 K Street, NW, Suite 1200  
Washington, DC 20006-1109

EXAMINER
----------

ANDERSON, CATHARINE L

ART UNIT	PAPER NUMBER
----------	--------------

3761

DATE MAILED: 04/19/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/970,673

Applicant(s)

MOLEE, KENNETH JOHN

Examiner

C. Lynne Anderson

Art Unit

3761

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 28 January 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-26 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

Art Unit: 3761

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 20 October 2003 has been entered.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Perdelwitz, Jr. et al. (5,968,855) in view of Ahr et al. (4,323,069).

Perdelwitz discloses all aspects of the claimed invention with the exception of an apertured film disposed between the inner layer and the absorbent core. Perdelwitz discloses an absorbent article 10, as shown in figure 1, comprising a liquid impervious outer layer 12, a liquid pervious inner layer 16, and an absorbent core 14. The absorbent article has a 300 mL rewet under load of less than 1.25 g, as disclosed in column 9, lines 23-45 and table 2. It therefore follows that the rewet under load for only 200 mL would inherently be less than 1.25 g as well.

With respect to the disclosure in the claims of the procedure for determining the rewet under load, the total amount of liquid applied to the article of Perdelwitz, and the pressure applied to the article, are the same as those disclosed in the instant claim. The application of pressure for 20 minutes following each 100 mL insult will remove liquid from the article after each insult, thus resulting is less total liquid present in the article of the present invention at the time of the third insult than the invention of Perdelwitz. It is therefore the examiner's position that the article of Perdelwitz inherently would meet the 200 mL and 300 mL rewet under load conditions claimed, since the rewet under load procedure disclosed by Perdelwitz results in a larger total volume of liquid present in the article following the third insult, as further described in the Response to Arguments below.

Ahr discloses an absorbent article 10, as shown in figure 2, comprising a liquid impervious outer layer 14, a liquid pervious inner layer 12, and an absorbent core 16. The absorbent article 10 further comprises an aperture film 40 disposed between the inner layer 12 and the absorbent core 16, as disclosed in column 11, lines 35-38. The apertured film 40 comprises a liquid impermeable film surface and a plurality of protrusions extending towards the absorbent core 16, each protrusion terminating in a aperture 46, as shown in figure 5. The addition of the apertured film 40 improves the rewet value of the absorbent article 10 without reducing the strikethrough time, as disclosed in column 12, lines 58-62.

It would therefore be obvious to one of ordinary skill in the art at the time of invention to construct the absorbent article of Perdelwitz with the apertured film of Ahr,

in order to further reduce the rewet of the absorbent article without also reducing the strikethrough time.

With respect to claim 2, Ahr discloses a tissue layer 36 surrounding the absorbent core 16 and apertured film 40, as shown in figure 2.

With respect to claim 3, the absorbent article of Perdelwitz further comprises a transfer layer 18 disposed between the inner layer 16 and absorbent core 14, as shown in figure 1.

With respect to claims 4 and 5, the apertured film 40 of Ahr covers substantially all of a surface of the absorbent core 16 and its insult region, as shown in figure 2.

With respect to claim 6, the protrusions of the apertured film 40 of Ahr extend substantially orthogonal to the liquid impermeable film surface, as shown in figure 5.

With respect to claim 7, the protrusions of the apertured film 40 of Ahr are substantially circular, as shown in figure 5.

With respect to claims 8 and 9, the apertured film 40 of Ahr discloses in column 11, lines 61-68, the incorporation by reference of Thompson (3,929,135). Thompson discloses an apertured film having protrusions that are substantially polygonal and rectangular, as disclosed in column 3, lines 46-50.

With respect to claim 10, the area of each protrusion of the apertured film 40 of Ahr is less at the aperture 46 than at the liquid impermeable film surface, as shown in figure 5.

With respect to claims 11-13, the apertured film 40 of Ahr discloses in column 11, lines 61-68, the incorporation by reference of Thompson (3,929,135). Thompson

Art Unit: 3761

discloses an apertured film having a loft of between 0.08 mm and 4.04 mm, as described in, column 4, lines 58-60.

With respect to claims 14-16, the term "porosity" used in the claims to mean something able to be measured in units of  $\text{m}^3_{\text{air}}/\text{min m}^2_{\text{film}}$ . However, the term has an accepted meaning of "a state of being porous" or "the ratio of the volume of interstices of a material to the volume of its mass." Under the accepted definition of the term "porosity", Ahr discloses the claimed invention. Ahr discloses a film 40 which is apertured, and therefore porous.

With respect to claims 17-19, Perdelwitz discloses a drain rate for the absorbent article, as disclosed in column 9, lines 23-34, but remains silent as to the drain rate for a square meter of the apertured film 40. It would have been obvious to one of ordinary skill in the art at the time of invention to construct the apertured film of Perdelwitz with a drain rate of between about  $597 \text{ kg/s m}^2_{\text{film}}$  and about  $995 \text{ kg/s m}^2_{\text{film}}$ , since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. *In re Aller*, 105 USPQ 233.

With respect to claims 20-23, the absorbent article of Perdelwitz has a 300 mL rewet under load of less than about 0.56 g, as disclosed in column 9, table 2, and therefore has a 200 mL rewet under load of less than about 0.56 g, as well.

With respect to claims 24-26, the absorbent article of Perdelwitz has a rewet value that meets the limitations of the claim. The rewet value is a measure of the amount of liquid that remains on the surface of the absorbent article during the rewet

Art Unit: 3761

test, and is essentially a measure of the surface wetness. If the absorbent article of Perdelwitz meets the limitations pertaining to the rewet value, it inherently meets the limitations pertaining to the surface wetness.

### ***Response to Arguments***

Applicant's arguments filed 20 October 2003 have been fully considered but they are not persuasive.

With respect to the Applicant's argument that the rewet under load procedure disclosed in the instant claim and the rewet under load procedure disclosed by Perdelwitz will provide different results, it is noted that the total amount of liquid applied to the article of Perdelwitz, and the pressure applied to the article, are the same as those disclosed in the instant claim. The application of pressure for 20 minutes following each 100 mL insult and measurement of rewet after each insult, as disclosed in the instant specification, will remove liquid from the article after each insult. At the beginning of each subsequent insult, the total liquid present in the article will be less than the total liquid present in the article of Perdelwitz at the beginning of each insult, i.e. before the second 100 mL insult is applied to the instant invention, the total amount of liquid present in the article will be the difference of the first insult (100 mL) and the first measured rewet value (the amount of liquid removed from the article during measurement). The total amount of liquid present in the article after the third 100 mL insult will be less than 300 mL when using the rewet under load procedure disclosed in the instant invention. Using the rewet under load procedure disclosed by Perdelwitz, however, the total amount of liquid after the third 100 mL insult will be 300 mL.

Art Unit: 3761

According to the procedure of Perdelwitz, there will be more liquid available to be drawn back out of the article during the rewet test following the third insult, and therefore the procedure of Perdelwitz will result in higher 300 mL rewet values than the procedure of the instant invention. It is therefore the examiner's position that the article of Perdelwitz inherently would meet the 300 mL, and thus also the 200 mL, rewet under load condition claimed.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to C. Lynne Anderson whose telephone number is (703) 306-5716. The examiner can normally be reached on Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor John Calvert can be reached on (703) 305-1025. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
JOHN Q. CALVERT  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 3700



Application/Control Number: 09/970,673

Page 8

Art Unit: 3761

W.A.  
cla

April 18, 2004